



PTO/SB/08A (08-03)

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**INFORMATION DISCLOSURE
STATEMENT BY APPLICATION**

(Use as many sheets as necessary)

Sheet

1

of

7

Complete if known

Application Number	10/726,771
Filing Date	December 2, 2003
First Named Inventor	Durrese et al.
Art Unit	2877
Examiner's Name	Tu T Nguyen
Attorney Docket Number	18525.04069

U.S. PATENT DOCUMENTS

Examiner Initials*	Cite No. ¹	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code ² (if known)			
TN	A	3428391	2/69	Newcomer	
	B	3755676	8/73	Kinsel	
	C	3892468	7/75	Duguay	
	D	4225938	9/80	Turpin	
	E	4344671	8/82	Lang	
	F	4474434	10/84	Carlsen et al.	
	G	4474435	10/84	Carlsen et al.	
	H	4546249	10/85	Whitehouse et al.	
	I	4929956	5/90	Lee et al.	
	J	5018816	5/91	Murray et al.	
	K	5117239	5/92	Riza	
	L	5276758	1/94	Hughes	
	M	5319477	6/94	DeJule	
	N	5418880	5/95	Lewis et al.	
	O	5463497	10/95	Muraki et al.	
	P	5465175	11/95	Woodgate et al.	
	Q	5512907	4/96	Riza	
	R	5592333	1/97	Lewis	
	S	5623360	4/97	Gesell et al.	
	T	5724163	3/98	David	
TN	U	5726752	3/98	Uno et al.	

(RDB0801.DOC;1) Examiner
Signature

TN

Date
Considered

2/20/2007

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**INFORMATION DISCLOSURE
STATEMENT BY APPLICATION**

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Sheet

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		Number-Kind Code ² (if known)			
<i>TN</i>	V	Not used			
	W	5852693	12/98	Jeong	
	X	5859697	1/99	Kaufeld et al.	
	Y	5936759	8/99	Buttner	
	Z	5973727	10/99	McGrew et al.	
	AA	6014244	1/2000	Chang	
	AB	6040880	3/2000	Tsuboi	
	AC	6064506	5/2000	Koops	
	AD	6181367	1/2001	McGrew et al.	
	AE	6188817	2/2001	Goodfellow	
	AF	6236506	5/2001	Cao	
	AG	6266176	7/2001	Anderson et al.	
	AH	Not used			
	AI	6388815	5/2002	Collins, Jr. et al.	
	AJ	6480323	11/2002	Messner et al.	
	AK	6522404	2/2003	Mikes et al.	
	AL	6525889	2/2003	Collins, Jr. et al.	
	AM	6535340	3/2003	Saruwatari	
	AN	6647164	11/2003	Weaver, et al.	
	AO	6674939	1/2004	Anderson et al.	
<i>TN</i>	AP	6711316	3/2004	Ducellier	

{RDB0801.DOC;1} Examiner
Signature*TN*Date
Considered

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Sheet

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10/726.771

Filing Date

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First Named Inventor

Durrresi et al.

Art Unit

2877

Examiner's Name

Tu T Nguyen

Attorney Docket Number

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		Filing Date	December 2, 2003
		First Named Inventor	Durresi et al.
		Art Unit	2877
		Examiner's Name	Tu T Nguyen
Sheet 4 of 7	Attorney Docket Number	18525.04069	

U.S. PATENT APPLICATION DOCUMENTS					
Examiner Initials*	Cite No. ¹	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code ² (if known)			
<i>ra</i>	AY	2002/0030814	3/2002	Mikes et al.	/
	AZ	2003/0202731	10/2003	Ionov et al.	
	BA	2004/0190823	9/2004	Leuthold et al.	
<i>ra</i>	BB	2005/0007668	1/2005	Serati et al.	
	BC	Not used			
	BD	Not used			
	BE	Not used			
	BF	Not used			
	BG	Not used			
	BH	Not used			

FOREIGN PATENT DOCUMENTS						
Examiner Initials*	Cite No. ¹	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages Or Relevant Figures Appear	T ⁶

(RDB0801.DOC;1) Examiner Signature	<i>ra</i>	Date Considered	2/20/07
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				Examiner's Name	Tu T Nguyen
Sheet	5	of	7	Attorney Docket Number	18525.04069

NON PATENT LITERATURE DOCUMENTS			
Examiner Initials*	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, pages(s), volume-issue number(s), publisher, city and/or country where published	T ²
<i>TN</i>	BI	Anderson, et al., Increasing Efficiency of Optical Beam Steerers, Draft Technical Report #3 for Harris Corporation, The Ohio State University, May 30, 2003, pp. 1-11	
	BJ	Anderson et al., Binary-Counting True Time Delay Generator Using a White Cell Design and Deformable Mirror Devices, LEOS, Orlando, FL, December 1998, 2 pgs.	
	BK	Anderson et al., Design Advances in Free-Space Optical True-Time Delay Device, PSAA-8, Monterey, CA, January 1998, 3 pgs.	
	BL	Anderson et al., Highly Parallel Optical Device to Produce True Time Delays for Phased Array Antennas, Allerton, September 1998, 14 pgs.	
	BM	Anderson et al., Optically Produced True-Time Delays for Phased Antenna Arrays, Applied Optics, vol. 36, no. 32, November 20, 1997, pp. 8493-8503	
	BN	Anderson et al., Optical Cross-Connect Based on Tip/Tilt Micromirrors in a White Cell, IEEE Journal of Selected Topics in Quantum Electronics, vol. 9, no. 2, March/April 2003, pp. 579-593	
	BO	Anderson, et al. Optical Interconnection Device Based on the White Cell, presentation at Notre Dame University November 6, 2002, 46 pgs.	
<i>TN</i>	BP	Anderson, Optical Interconnections, Optical True-Time Delays, and More..., presentation at University of Colorado January 28, 2003, 61 pgs.	
	BQ	Not used	
<i>TN</i>	BR	Anderson, et al., Polynomial-based optical true-time delay devices with microelectromechanical mirror arrays, Applied Optics, vol. 41, no. 26, September 10, 2002, pp. 5449-5461	
	BS	Not used	
	BT	Not used	

(RDB0801.DOC;1) Examiner Signature	<i>TN</i>	Date Considered	2/2/07
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		First Named Inventor	Durresi et al.
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Sheet	6	of	7

NON PATENT LITERATURE DOCUMENTS			
Examiner Initials*	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, pages(s), volume-issue number(s), publisher, city and/or country where published	T ²
TN	BU	Argueta-Diaz, et al. Reconfigurable Photonic Switch Based on a Binary System Using the White Cell and Micromirror Arrays, IEEE Journal of Selected Topics in Quantum Electronics, vol. 9, no. 2, March/April 2003, pp. 594-602	
	BV	Chen et al., 1-to-12 Surface Normal Three-Dimensional Optical Interconnects, Applied Physics Letters 63(14), October 4, 1993, pp. 1883-1885	
	BW	Cohen et al., Optically Controlled Serially Fed Phased Array Sensor, IEEE Photonics Technology Letters, vol. 8, no. 12, December 1996, pp. 1683-1685	
	BX	Collins et al., Numerical Optical Data Processing, Proceedings of the 1978 International Optical Computing Conference, London, England, September 1978, pp. 194-197	
	BY	Collins et al., Optics for Numerical Calculations, Proceedings of ICO-11 Conference, Madrid, Spain, 1978, pp. 311-314	
	BZ	Collins, Jr. et al., Optical True Time Delay for Phased Array Antennas Based on the White Cell, GOMAC, Monterey, CA, March 1999, 4 pgs	
	CA	Collins, Numerical Optical Data Processor, SPIE, vol. 128, Effective Utilization of Optics in Radar Systems, 1977, pp. 313-319	
	CB	Ewing et al., Advancements in LCoS Optical Phased Array Technology, SPIE Great Lakes Regional Symposium, Cleveland, OH, June 7, 2004, pp. 1-23	
	CC	Fairley et al., The Microphotonics Revolution, Mit's Magazine of Innovation, Technology Review, July/August 2000, pp. 38-44	
	CD	Freitag et al., A Coherent Optically Controlled Phased Array Antenna System, IEEE Microwave and Guided Wave Letters, vol. 3, no. 9, September 1993, pp. 293-295	
	CE	Goutzoulis et al., Hybrid Electronic Fiber Optic Wavelength-Multiplexed System for True Time-Delay Steering of Phased Array Antennas, Optical Engineering, vol. 31, no. 11, November 1992, pp. 2312-2322	

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TN	CF	Higgins et al., Design and demonstration of a switching engine for a binary true-time-delay device that uses a White cell, Applied Optics, vol. 42, no. 23, August 10, 2003, pp. 4747-4757	
	CG	Not used	
	CH	Li et al., Angular Limitations of Polymer-Based Waveguide Holograms for 1-to-many V-shaped Surface-Normal Optical Interconnects, Applied Physics Letters 65(9), August 29, 1994, pp. 1070-1072	
	CI	Liu et al., Cascaded Energy-Optimized Linear Volume Hologram Array for 1-to-many Surface-Normal Even Fan-Outs, Optics and Laser Technology, vol. 29, no. 6, 1997, pp. 321-325	
	CJ	Not used	
	CK	Rader, et al., Demonstration of a Linear Optical True-time Delay Device by Use of a Microelectromechanical Mirror Array, Applied Optics, vol. 42, no. 8, March 10, 2003, pp. 1409-1416	
	CL	Saleh et al., Fundamentals of Photonics, Wiley, August 1991	
	CM	White, Long Optical Paths of Large Aperture, Journal Optical Society America, vol. 32, May 1942, pp. 285-288	
	CN	White, Very Long Optical Paths in Air, Journal Optical Society America, vol. 66, no. 5, May 1976, pp. 411-416,	
	CO	Yen et al., Operation of a Numerical Optical Data Processor, 1980, SPIE vol. 232, International Optical Computing Conference, 1980, pp. 160-167	

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